

To: Fitz-James, Schatzi[Fitz-James.Schatzi@epa.gov]; Gartner, Lois[Gartner.Lois@epa.gov]; Dreyfus, Melissa G.[Dreyfus.Melissa@epa.gov]
Cc: Wells, Suzanne[Wells.Suzanne@epa.gov]; Mahmud, Shahid[Mahmud.Shahid@epa.gov]; Countryman, Kevin[Countryman.Kevin@epa.gov]
From: Zaragoza, Larry
Sent: Thur 8/27/2015 11:54:58 AM
Subject: FW: 10-year-old Gold King article Now a 5-month-old article, very comprehensive

Hi Schatzi, Lois and Melissa,

This is an informative summary from Kevin. I thought you would be interested.

Larry

From: Countryman, Kevin
Sent: Wednesday, August 26, 2015 3:43 PM
To: Mahmud, Shahid; Wirschafter, Joshua; Hillenbrand, John; Price, Lisa; Moreen, Ed; Hathaway, Ed
Cc: Stalcup, Dana; Wells, Suzanne; Zaragoza, Larry
Subject: RE: 10-year-old Gold King article Now a 5-month-old article, very comprehensive

Below is a comprehensive analysis of the site's issues, published this past March (i.e., well before the spill). It discusses the Animas River Stakeholders Group (ARSG), and was published by the Colorado Foundation for Water Education. Their stated mission is:

"to promote better understanding of Colorado's water resources and issues by providing balanced and accurate information and education. We accomplish our mission through the production of high-quality educational tools and experiences— which we've been doing since 2002. When implementing these programs, CFWE maintains an unbiased, objective viewpoint that encompasses diverse perspectives on water resource issues. CFWE advocates only for the availability of unbiased water education information. We never take a position or lobby on specific water issues"

For a good summary of the players, the positions they had staked out going into the August spill, regulatory efforts, and funding constraints, this is the article to read.

<http://blog.yourwatercolorado.org/2015/03/19/animas-river-stakeholders-group-an-unlikely-alliance-for-watershed-health-in-the-san-juans/>

Some excerpts:

A turning point in the Animas River Stakeholder Group's mission came after the last mining company to operate in Silverton, Sunnyside Gold Corp., built three massive bulkheads inside the vast underground workings of the Sunnyside Mine in the upper Cement Creek drainage starting in 1996 as part of an agreement with the State of Colorado that released the mine company from environmental liability.

The bulkheads were intended to act as corks, simply preventing water from draining out of the mine. The first one worked well, but when two more were added downstream in the tunnel six years later, the bulkheads collectively ended up functioning more as a bathtub plug, causing the water table inside the mountain to rise and eventually gush out of other mine adits—horizontal passages leading into a mine for the purposes of access or drainage—higher in the upper Cement Creek drainage.

Today [Remember, this was published last March], the volume of polluted water pouring out of a group of these adits, all on the same slope—the American Tunnel, the Red and Bonita, the Gold King, and the Mogul—is equal to the contributions of the 33 most-polluting mines the Animas Stakeholders group identified during its initial study 15 years ago.

Collectively, these leaky adits have created one of the largest untreated mine drainages in Colorado

In short, all of the hard-won gains in water quality that the Animas River Stakeholders Group made in its first decade were washed away as the water quality of the Animas River below Cement Creek worsened between 2005 and 2010. Metal-loading in the stream killed off three out of four fish species as well as a host of bugs and insects that formerly lived there, and sent toxic levels of zinc as far downstream as Baker's Bridge near Durango...

The most comprehensive—and expensive—fix would be to install a permanent limestone water treatment plant in the upper Cement Creek drainage, which would cost upwards of \$17 million to build and at least a million dollars a year to operate in perpetuity. This solution would likely only be feasible if a Superfund site were declared, potentially putting Sunnyside and its parent Kinross Gold Corp., an international mining conglomerate that has generated billions in annual revenue in recent years, on the hook to help foot the bill.

Sunnyside has threatened legal action if the U.S. Environmental Protection Agency pursues a Superfund designation, and the community of Silverton is also largely opposed to the idea, fearing it would scare away tourists as well as prospective new mine operations, thus damaging an economy that is as already as fragile as alpine tundra.

Rather than squabbling over the politics of Superfund, the Animas Stakeholders (whose members include designees from both EPA and Sunnyside) are working to determine if it is possible to reduce the volume of water coming out of the leaky mines in the upper Cement Creek drainage by putting in new bulkheads, thereby perhaps eliminating the need for a permanent water treatment plant—and Superfund designation.

The EPA plans to install the first of these new bulkheads in the Red and Bonita Mine this

summer.